

Appendix C

Visitor Data

This appendix presents a sampling of relevant data from recent visitor surveys. The studies summarized in this section should be reviewed in their entirety to understand the context of the data and the methods used. Visitor surveys are needed on an ongoing basis for the purpose of more clearly understanding levels of satisfaction with National Park Service management practices, services provided, tolerances for particular visitor density levels, demographic characteristics, and increased understanding due to educational efforts.

The data included here represent some of the ongoing visitor information being collected at Yosemite National Park. Ultimately, these data can be used in determining user capacities, derived from a combination of information representing ecosystem health, visitor experience, and educational and management objectives. These studies were not aimed specifically at the Merced River corridor, but begin to provide some base information for assessing visitor use and experience trends.

Summary of 1990-91 Visitor Study

Source: *Visitors, Alternative Futures and Recreational Displacement at Yosemite National Park* (Gramann 1992)

This study utilized automobile passenger, bus passenger, and out-of-park household surveys to obtain a representative sample of Yosemite's visitors to derive their demographic characteristics, trip characteristics, evaluation of the park, and the kinds of displacements that occur due to park conditions.

This study found that although visitor satisfaction was generally high, a sizable percentage of both automobile and bus passengers felt that the numbers of people and amount of traffic in Yosemite Valley were too high in the summer. This study used a method correlating certain variables, such as a high value placed on solitude, natural scenery, relaxation, recreational opportunities, and experience of nature to determine how satisfaction in those areas affected perceptions of crowding. The study found that as the value for each of the variables increased, so did the perception of crowding.

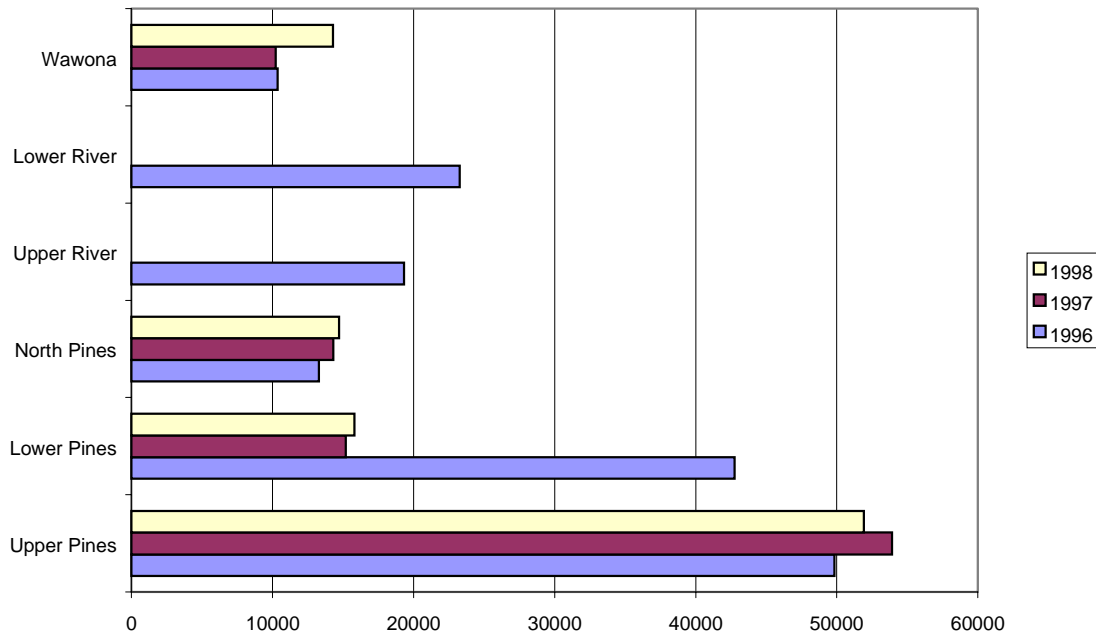
This study sampled households in the counties surrounding the park and upon that based its estimate that a minimum of 2.4 million potential park visitors would not visit Yosemite National Park due primarily to perceptions of crowding.

Summary of 1996-1998 Campsite Occupancy Data

Source: Yosemite National Park

As illustrated in figure C-1 (Campsites Utilized), campsite occupancy in Yosemite Valley dropped from 1996 to 1998. Much of this drop is due to the closing of campsites following the 1997 flood. Camping in Wawona increased slightly from 1996 to 1998.

Figure C-1: Campsites Utilized



As shown in figure C-2 (Percentage of Campsites Utilized), nearly 100 percent of campsites open to the public at a given time in Yosemite Valley are occupied over the course of the year. There are no data for Upper and Lower River Campgrounds beyond 1996, since these campgrounds were completely closed following the 1997 flood. In Wawona, the occupancy rate increased from 48% in 1996 to 76% in 1998.

Summary of 1996-1999 Visitor Data

Source: *Monthly Public Use Report*, U.S. Department of the Interior

Figure C-3 (Total Visits) shows the seasonal fluctuation in park visits. Visitation generally peaks in August, with a sharp decrease in the winter months. Visitation dropped substantially following the January 1997 flood, and in November 1998 (when road reconstruction on the El Portal Road began).

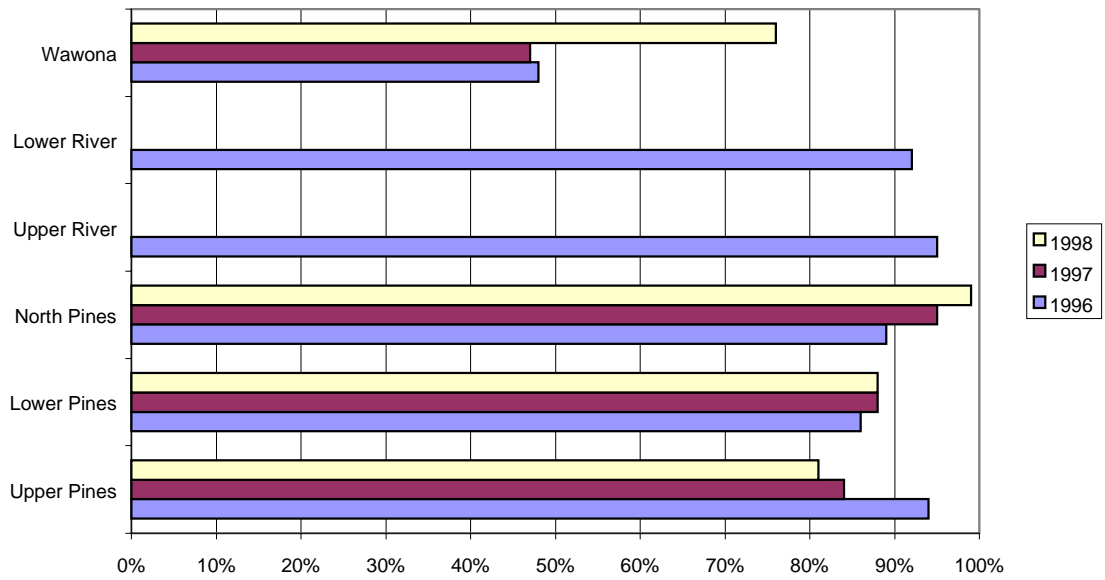
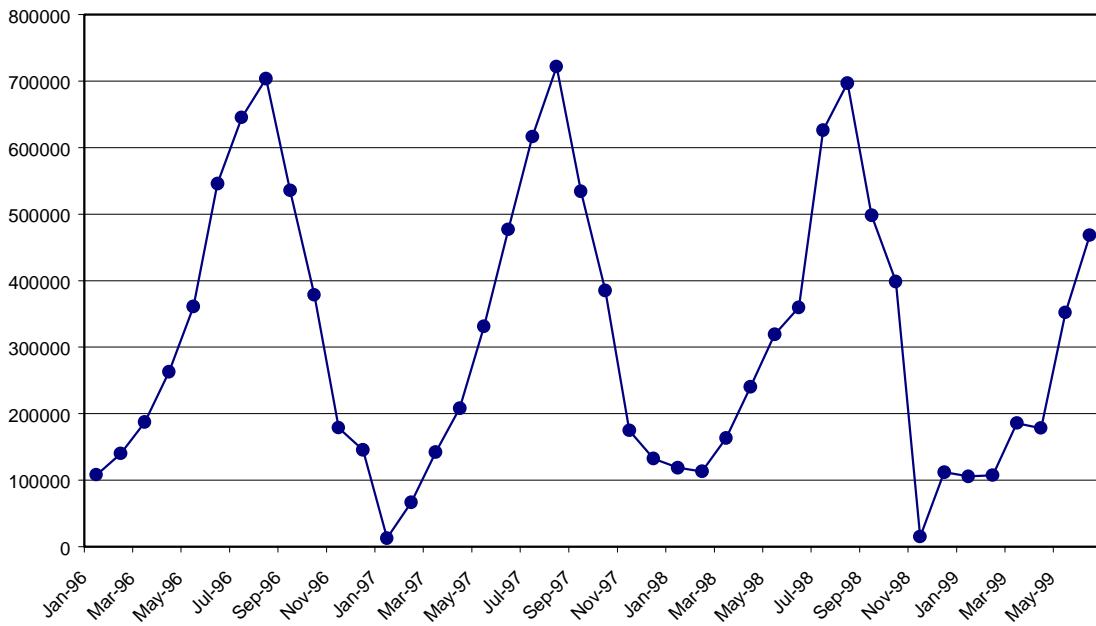
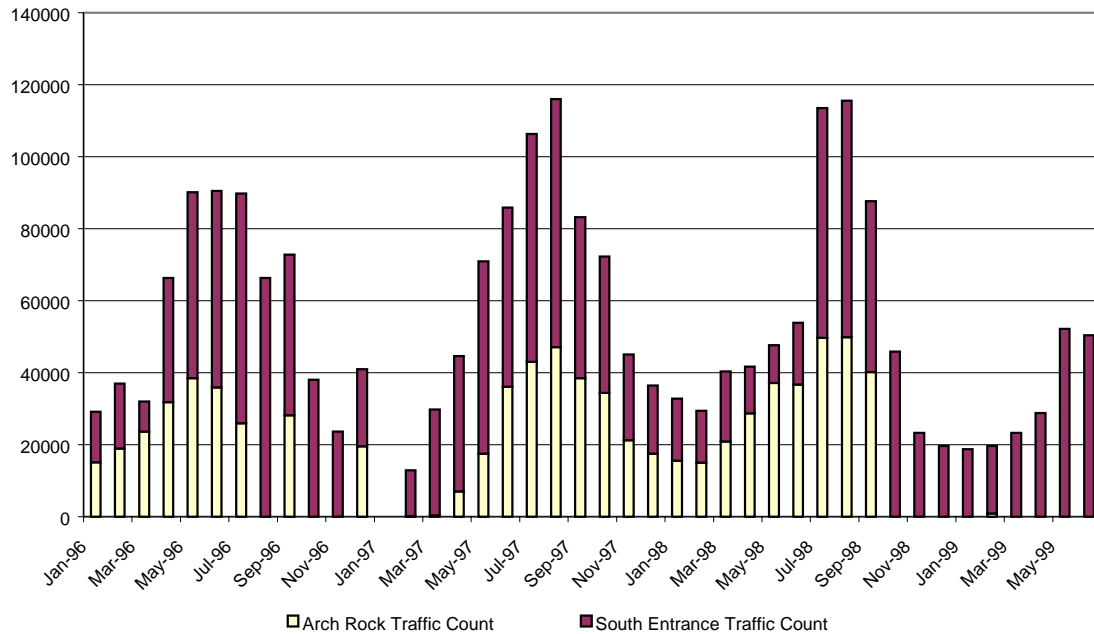
Figure C-2: Percentage of Campsites Occupied**Figure C-3: Total Visits**

Figure C-4 (Traffic Counts at Arch Rock and South Entrance Stations) also shows a seasonal fluctuation in traffic counts at the South Entrance Station and the Arch Rock Entrance Station. There are no data for the Arch Rock Entrance Station after November 1998, following its closure for construction work on the El Portal Road.

Figure C-4: Traffic Counts



Summary of Recent User Capacity Research

Source: *Carrying Capacity Research for Yosemite Valley - Phase I Study* (Manning 1999)

The objectives of this study were to develop information to help formulate indicators and standards of quality for visitor experience at two study sites and to extrapolate from that an estimate of the maximum daily number of visitors to Yosemite Valley that maintains a standard of quality. The study focuses its attention on the visitors' perception of crowding.

Below is a summary of findings from surveys conducted at Vernal Fall and at Yosemite Falls.

Summary of Survey Data Collected at Vernal Fall

Indicators of Quality

- Most Enjoyable Aspects of Visit to Yosemite Valley:
 - Scenery and natural beauty: 35.2%
 - Hiking/walking/specific trail: 28.7%
- Least Enjoyable Aspects of Visit to Yosemite Valley:
 - Crowds: 41.7%
 - Nothing: 15.5%
 - Traffic: 5%
- Suggestions for Improvement:
 - Reduce traffic/Eliminate cars/buses: 18.6% (largest category)
 - All others: <5% each
- Views of Problems in the Valley
 - Traffic: 76.5%
 - Parking: 75.3%
 - Careless drivers: 55.5%
 - Too many buses: 48.8%
 - Crowding on trails: 68.1%
 - Noise : 50%
 - Too many rules: 18.9%
 - Crowding at attractions: 51%

Standards of Quality

- Crowding on the Trail to Vernal Fall (based upon impressions of visitor density photographs, listed in terms of average number of visitors observable at any given time)
 - Maximum number of people that is acceptable to individuals: 21 people
 - Preferred number of people: 11 people
 - Number of people that would cause others to stop using the trail: 39 people
 - Average number of people typically seen on the trail: 19 people
 - Number of people the NPS should allow on the trail: 30 people (although 16% said NPS should impose no limits)
- How Crowded was the Trail:
 - Extremely: 5%
 - Moderately: 74.8%
 - Not at all: 20.2%
- Threshold of Acceptability for the Number of People on the Trail per Day: 5,037 people per day

- How Crowded in Yosemite Overall:
 - Extremely: 5.5%
 - Moderately: 74.4%
 - Not at all: 20.1%

Survey Summary of Data Collected at Yosemite Falls

Indicators of Quality

- Most Enjoyable Aspects of Visit to Yosemite Valley
 - Scenery and natural beauty: 42.5%
 - Yosemite Falls: 25.1%
 - Nature and environment: 11.5%
 - Hiking/walking/Specific trail: 10.7%
- Least Enjoyable Aspects of Visit to Yosemite Valley:
 - Crowds: 22.5%
 - Nothing: 20.2%
 - Restroom cleanliness: 7.7%
 - Traffic: 6.8%
- Suggestions for Improvement:
 - Reduce traffic/Eliminate cars/buses: 19.7%
 - Nothing: 19.4%
 - Increased information/education: 14.7%
 - Cleaner restrooms/more restrooms: 6.6%
 - Reduce crowding: 5%
- Views of Problems in the Valley
 - Parking: 72.6%
 - Traffic: 65.1%
 - Careless drivers: 56%
 - Too many buses: 52.7%
 - Crowding: 56.3%
 - Noise 51.3%
 - Too many rules: 20.7%

Standards of Quality

- Crowding on the Trail to Yosemite Falls
 - Threshold of acceptability: 40 people
 - Maximum number of people that is acceptable to individuals: 32 people
 - Preferred number of people: 18 people
 - Number of people that would cause others to stop using the trail: 60 people
 - Number of people the NPS should allow on the trail: 46 people
 - Average number of people typically seen on the trail: 27 people

- How Crowded was the Trail:
 - Extremely: 3.3%
 - Moderately: 57.4%
 - Not at all: 39.2%
- Crowding at the Base of Yosemite Falls (based upon impressions of visitor density photographs in terms of average number of visitors viewed at any given time)
 - Threshold of acceptability: 92 people
 - Maximum Number of people that is acceptable to individuals: 75 people
 - Preferred number of people: 43 people
 - Number of people that would cause others to stop using the trail: 126 people
 - Number of people the NPS should allow on the trail: 100 people
 - Average number of people typically seen on the trail: 59 people
- How Crowded was the Trail:
 - Extremely: 32.9%
 - Moderately: 61.4%
 - Not at all: 35.3%